

ABSTRACT

A punching apparatus is provided which can of punch a
5 non-circular holes at a predetermined position of a work piece. In the
punching apparatus for punching a hole by means of a punch integrated
into any one of the moving part of a press working machine or the
supporting part of the press working machine, and a die integrated with
the other one of the moving part and the supporting part; each of the punch
10 and the die has plurality of planes to be fitted with datum planes of a
fitting jig. The punching unit for the punching apparatus comprises a
punch, a die, and a fitting jig for positioning the punch and the die with
respect to each other, wherein each of the punch and the die has plurality
of faces for fitting and the fitting jig has datum planes to be fitted with the
15 planes for fitting of the punch and the die.